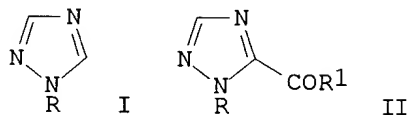
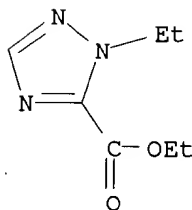


L14 ANSWER 52 OF 73 CAPLUS COPYRIGHT 2003 ACS  
 ACCESSION NUMBER: 1987:67205 CAPLUS  
 DOCUMENT NUMBER: 106:67205  
 TITLE: 1H-1,2,4-triazole derivatives. Preparation and  
 reaction of 1-alkyl-1H-1,2,4-triazole-5-carboxylic  
 acid derivatives  
 AUTHOR(S): Dallacker, Franz; Minn, Klemens  
 CORPORATE SOURCE: Inst. Org. Chem., RWTH, Aachen, D-5100, Fed. Rep.  
 Ger.  
 SOURCE: Chemiker-Zeitung (1986), 110(3), 101-8  
 CODEN: CMKZAT; ISSN: 0009-2894  
 DOCUMENT TYPE: Journal  
 LANGUAGE: German  
 OTHER SOURCE(S): CASREACT 106:67205  
 GI



AB The 1H-1,2,4-triazoles I [R = (un)substituted alkyl, Ph, tetrahydrofuryl,  
 tetrahydropyranyl] (19 compds.) were prepd. by reaction of alkali salts  
 of 1,2,4-triazole with alkyl or benzyl halides, as well as by Michael addn.  
 or by condensation of arylhydrazines and HCONH<sub>2</sub>. These triazoles were  
 converted to ketones II [R<sub>1</sub> = (un)substituted alkyl, Ph, 2-furyl,  
 2-thienyl] by reaction with acyl halides. 1H-1,2,4-Triazole-5-carboxylic  
 acid esters II (R<sub>1</sub> = OMe, OEt) were prepd. by reaction of I with ClCOR<sub>1</sub>  
 in the presence of Et<sub>3</sub>N, and converted to amides and hydrazides with NH<sub>3</sub> or  
 N<sub>2</sub>H<sub>4</sub>.  
 IT **106535-33-5P 106535-34-6P**  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)  
 (prepn. and amidation of)  
 RN 106535-33-5 CAPLUS  
 CN 1H-1,2,4-Triazole-5-carboxylic acid, 1-ethyl-, ethyl ester (9CI) (CA  
 INDEX NAME)



103(a)  
 ⇒ positional  
 isomer

L14 ANSWER 43 OF 73 CAPLUS COPYRIGHT 2003 ACS

ACCESSION NUMBER: 1988:423289 CAPLUS

DOCUMENT NUMBER: 109:23289

TITLE: Synthesis and properties of acyclic analogs of ribavirin

AUTHOR(S): Tsilevich, T. L.; Kochetkova, S. V.; Shchhaveleva, I. L.; Smirnov, I. P.; Gottikh, B. P.; Florent'ev, V. L.

CORPORATE SOURCE: Inst. Mol. Biol., Moscow, USSR

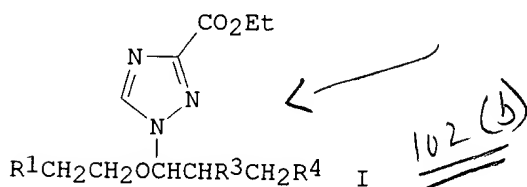
SOURCE: Bioorganicheskaya Khimiya (1987), 13(9), 1240-4

CODEN: BIKHD7; ISSN: 0132-3423

DOCUMENT TYPE: Journal

LANGUAGE: Russian

GI



$R^1 = \text{alkyl}$   
 $R^4 = OH$   
 $R^3 = H$

AB The title compds. I ( $R^1 = R^3 = H$ ,  $R^4 = OH$ , Cl;  $R^1 = OH$ ,  $R^3 = H$ ,  $R^4 = Cl$ , OH;  $R^1 = H$ , OH,  $R^3 = R^4 = OH$ ), with a cleaved C3'-C4' furanose bond, were prep'd. by condensation of the trimethylsilyl deriv. of 3-(ethoxycarbonyl)-1,2,4-triazole with appropriate alkylating agents in the presence of  $SnCl_4$ , followed by treatment with  $NH_3-MeOH$ . Some syntheses of the alkylating agents are also described.

IT 114988-40-8P 114988-41-9P 114988-42-0P

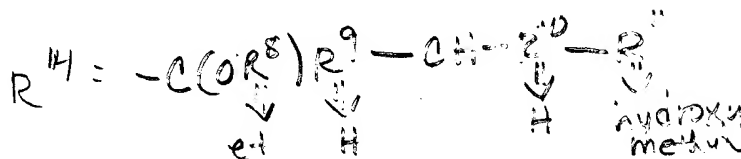
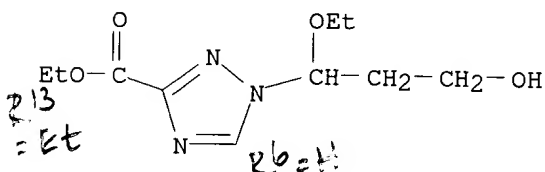
114988-43-1P 114988-44-2P 114988-45-3P

114988-51-1P 114988-52-2P

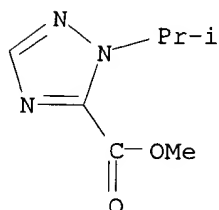
RL: SPN (Synthetic preparation); PREP (Preparation)  
(prepn. of, as acyclic analog of ribavirin)

RN 114988-40-8 CAPLUS

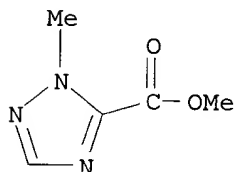
CN 1H-1,2,4-Triazole-3-carboxylic acid, 1-(1-ethoxy-3-hydroxypropyl)-, ethyl ester (9CI) (CA INDEX NAME)



RN 106535-34-6 CAPLUS  
CN 1H-1,2,4-Triazole-5-carboxylic acid, 1-(1-methylethyl)-, methyl ester  
(9CI) (CA INDEX NAME)



IT **57031-65-9P**  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
(Reactant or reagent)  
(prepn. and reaction of, with hydroxylamine)  
RN 57031-65-9 CAPLUS  
CN 1H-1,2,4-Triazole-5-carboxylic acid, 1-methyl-, methyl ester (9CI) (CA  
INDEX NAME)



IT **106535-31-3P**  
RL: SPN (Synthetic preparation); PREP (Preparation)  
(prepn. of)  
RN 106535-31-3 CAPLUS  
CN 1H-1,2,4-Triazole-5-carboxylic acid, 1-methyl-, ethyl ester (9CI) (CA  
INDEX NAME)

